obsolescence as they provide for substantially faster recovery than current retirements would dictate. Historical retirements average 5 percent or less of plant each year, while the depreciation ranges provide for recovery of up to 8.5 percent of the plant each year. The difference between the historical retirement rate and the 8.5 percent rate demonstrates anticipation of future obsolescence not evident in historical retirements trends. The range reflects economic life and not physical life. In addition, the models used do not, themselves, fully reflect economic costs as they do not reflect annual valuation changes but instead develop the levelized cost over the economic life.

Dr. Aron contended the risk of stranded plant is not reflected in the depreciation ranges. The models themselves reflect this risk in the use of fill factors. This Commission has already recognized and concluded in the first order in this docket "that fill factors that are lower than is feasible engineering-wise can still be reasonable now that facilities-based competition can exist and the uncertainty of the demand forecasts is greater." The Commission finds no inconsistency with the range of depreciation rates determined in docket 05-DT-101 and the idealized forward-looking cost models.

The Wisconsin Act also recognized the importance of responding to technological change. The provisions s. 196.09(9)(a)(2), Wis. Stats., require the depreciation ranges to be updated biennially, and allow for earlier review upon request. Ameritech has not appealed the order in docket 05-DT-101 or requested an earlier review. Docket 05-DT-102 is currently open to evaluate revision of these depreciation ranges. Because of the dynamic nature of the ranges of depreciation rates set under s. 196.09(9), Wis. Stats., application of the ranges set thereunder to TELRIC studies is reasonable and appropriate.

The Commission considered the overall depreciation rate when making reference to the order in docket 05-DT-101. The composite 8.5 percent depreciation rate is reasonable when the relative investment in long-lived assets like poles and wire and the relative investment in short-lived assets like electronics is considered. However, it is reasonable to allow Ameritech to propose revision of its rates for unbundled network elements to reflect changes in the range of depreciation rates allowed in future proceedings. Such revision will be subject to Commission review and approval.

MCI asserted that Ameritech's adjustments, to meet the Commission's depreciation rate adjustment, did not lower prices for unbundled elements by as much as would be predicted by its sensitivity analysis. Staff sensitivity analysis shows the adjustment resulting from the depreciation requirement was within the magnitude expected.

MCI makes a generic appeal that cost studies should be further reviewed allowing more time and participation. The Commission finds that the cost studies have been thoroughly examined and that paper proceedings have been adequate and included sufficient opportunity to comment. The Commission determined cost studies were not being revisited in this proceeding.

- 5. (b) No adjustment is required on this issue in the first order.
- 5. (c) Ameritech must revise all its rates for unbundled elements to reflect joint and common costs based on 1997 total joint and common costs divided by 1997 total demands.

Ameritech's January 10, 1997, Statement did not comply with this requirement.

Ameritech had increased its markup for unbundled elements to include those retailing costs that would be avoided in the wholesale environment. The Commission determined that only those

costs that would continue in a wholesale environment are appropriate to include in the markup on unbundled elements for joint and common costs.

MCI asserts that defects exist in Ameritech's forecast of joint and common costs and Ameritech has not properly allocated these costs to unbundled elements on a per-unit basis. The first order explains that staff analysis of joint and common costs started with actual historical costs related to network services. These were adjusted for known changes based on the Arthur Andersen growth rate of 8 percent a year. This growth rate was deemed reasonable in light of the more complex business environment that will exist. That order also explained that staff raised concerns about the demand units over which costs were spread. Accordingly, the Commission required that the annual joint and common costs were to be allocated over all demands. In practice the TELRIC cost was summed for all demand units of both bundled and unbundled services and was compared to the annual joint and common costs to determine the markup percent. The Commission reaffirms its first order requirements regarding the amount and allocation of joint and common costs.

Ameritech's March 3, 1997, Statement and associated tariffs now comply with this requirement. The markup on TELRIC is now 23.4 percent and is applied uniformly. The first order indicated, "Staff estimated the effect of this adjustment will be to reduce Ameritech's proposed mark-up on TELRIC from 27 to 22 percent." With the further identification of costs that will continue in the wholesale environment as is discussed under "Resale" below, the Commission finds that the 23.4 percent markup is reasonable.

6. (a) Ameritech must remove the differential pricing of Zone A, Zone B, and Zone C and price all unbundled loops on a geographically uniform basis, unless

Ameritech proposes an economically rational system of deaveraged prices, together with full technical, economic, and cost support.

Ameritech's January 10, 1997, filing did not fully comply with this requirement.

Ameritech filed an average rate that was higher than the highest rate of Zone C. Ameritech's

March 3, 1997, filing does comply with this requirement because it has computed average loops rates based on relative access lines in each former Zone.

Time Warner and MCI assert that a statewide average loop rate is not based on cost and proper zone rates should be established. The Commission reaffirms its decision stated in its first order that Ameritech's zone pricing scheme does not sufficiently reflect cost variability factors for loops. Maintaining a statewide average loop rate is more reasonable in the short time period that it is likely to be in effect, than to adopt a flawed zone pricing scheme in conjunction with average-priced retail lines when the combination has been shown to have unreasonable price squeezing effects. Under its election to be a price regulated utility, Ameritech's retail prices are only frozen by statute until September 1997. Ameritech may request approval for deaveraging both retail line and wholesale loop rates on a common basis at that time.

- 6. (b) No adjustment is required on this issue in the first order.
- 6. (c) Ameritech must include in the price of a port only those features that appear on a typical port for the service line classification, including separate residence and business ports.

Ameritech's January 10, 1997, filing included separate prices for unbundled residence and business ports. However, Ameritech had refused staff access to cost support information stating that the material was proprietary to Bellcore. In the Commission's February 20, 1997,

oral decision, the Commission required Ameritech to make arrangements for staff to review cost support for unbundled ports. Contracting with third parties does not relieve Ameritech of its obligation to provide cost support for Commission review. Ameritech did provide such access, however, review of this requirement is not complete. Therefore, the cost basis for Ameritech's price differentiation by line class for unbundled ports will be an outstanding issue when Ameritech refiles its Statement.

# iii. Nondiscriminatory Access to Poles, Ducts, Conduits, and Rights-of-Way

- 1. All terms and conditions related to rights-of-way must be included in interconnection tariffs.
- 2. Ameritech's offering must be revised to make it clear access will be provided to rights-of-way held by ownership of property as well as rights-of-way acquired from other property owners.
- 3. While Ameritech must provide "pathways" through its manholes, etc., to allow access to its rights-of-way, the existence of such pathways does not imply that interconnection in such "pathways" is automatically feasible.
- 4. Ameritech must revise its offering to state that if access is not granted within 45 days, then the utility will confirm the denial in writing including all relevant evidence and how such evidence or information relate to a denial in conformance with the Federal rules.
  - 5. No adjustment is required on this issue in the first order.
  - 6. No adjustment is required on this issue in the first order.
  - 7. No adjustment is required on this issue in the first order.

Ameritech's January 10, 1997, and March 3, 1997, Statements included its "Pole Attachments and Conduit Occupancy Accommodations tariff" which contains terms and conditions to meet all but number 3 of the four required actions. The tariff still needs to be revised to accommodate the Commission's "pathways" requirement.

## iv. Unbundled Local Loop Transmission

The Commission's first order indicated that all concerns related to unbundled local loop transmission were addressed elsewhere in the order. For example, the discussion of nondiscriminatory access to unbundled elements addressed all pricing issues.

## v. & vi. Unbundled Local Transport and Local Switching

The discussion below combines discussion of both unbundled local transport and unbundled local switching as these two elements are inextricably combined in Ameritech's Statement. (Ameritech requires the purchase of certain transport elements in order to purchase unbundled local switching instead of existing retail access services.) Quotations from relevant statutes and regulations are given herein to provide a legal framework for the discussion in a manner similar to the presentation in the first order.

The Commission's first order indicated that unbundled local transport and unbundled local switching were addressed elsewhere in the order, however, the Commission also identified certain unbundled element issues about which it would be willing to receive additional information. Those issues were (with the heading under which they appear in the discussion in this order shown in parenthesis): collocation of remote switching modules (same heading), availability of dark fiber (Dark fiber); shared interoffice transport (Shared/common transport),

and six possible deficiencies in the local switching element. Those six items were: recognition of the provider of exchange access (Provider of exchange access service), provision of customized routing (Customized routing functions), restriction of use for terminating services (Provider of exchange access service), availability of vertical features (Vertical features), the usage development and implementation charge (same heading) and the viability of Ameritech's offering. This order provides decisions on all of these additional items except the viability of Ameritech's offering.

# **References for Unbundled Local Transport**

#### Relevant Provisions of the Act

### § 271(c)(2)(B) COMPETITIVE CHECKLIST

- (v) Local transport from the trunk side of a wireline local exchange carrier switch unbundled from switching or other services.
- § 251 (c)(3) UNBUNDLED ACCESS.--The duty to provide, to any requesting telecommunications carrier for the provision of a telecommunications service, nondiscriminatory access to network elements on an unbundled basis at any technically feasible point on rates, terms, and conditions that are just, reasonable, and nondiscriminatory in accordance with the terms and conditions of the agreement and the requirements of this section and section 252. An incumbent local exchange carrier shall provide such unbundled network elements in a manner that allows requesting carriers to combine such elements in order to provide such telecommunications service.

#### Selected sections of FCC rules (not under stay)

# § 51.307 Duty to provide access on an unbundled basis to network elements.

(c) An incumbent LEC shall provide a requesting telecommunications carrier access to an unbundled network element, along with all of the unbundled network element's features, functions, and capabilities, in a manner that allows the requesting telecommunications carrier to provide any telecommunications service that can be offered by means of that network element.

(d) An incumbent LEC shall provide a requesting telecommunications carrier access to facility or functionality of a requested network element separate from access to the facility or functionality of other network elements, for a separate charge.

#### § 51.309 Use of unbundled network elements.

- (b) A telecommunications carrier purchasing access to an unbundled network element may use such network element to provide exchange access services to itself in order to provide interexchange services to subscribers.
- (c) A telecommunications carrier purchasing access to an unbundled network facility is entitled to exclusive use of that facility for a period of time, or when purchasing access to a feature, function or capability of a facility, a telecommunications carrier is entitled to use of that feature, function, or capability for a period of time. ...

# § 51.319 Specific unbundling requirements.

#### (d) Interoffice Transmission Facilities

- (1) Interoffice transmission facilities are defined as incumbent LEC transmission facilities dedicated to a particular customer or carrier, or shared by more than one customer or carrier, that provide telecommunications between wire centers owned by incumbent LECs or requesting telecommunications carriers, or between switches owned by incumbent LECs or requesting telecommunications carriers.
  - (2) The incumbent LEC shall:
- (i) provide a requesting telecommunications carrier exclusive use of interoffice transmission facilities dedicated to a particular customer or carrier, or use of the features, functions, and capabilities of interoffice transmission facilities shared by more than one customer or carrier:
- (ii) provide all technically feasible transmission facilities, features, functions, and capabilities that the requesting telecommunications carrier could use to provide telecommunications services;
- (iii) permit, to the extent technically feasible, a requesting telecommunications carrier to connect such interoffice facilities to equipment designated by the requesting telecommunications carrier, including, but not limited to, the requesting carrier's collocated facilities; and
- (iv) permit, to the extent technically feasible, a requesting telecommunications carrier to obtain the functionality provided by the incumbent LEC's digital cross-connect systems in the same manner that the incumbent LEC provides such functionality to interexchange carriers;

Selected descriptions in the body of 96-325, FCC Interconnection Order in CC Docket No. 96-98:

- 412. We define the local switching element to encompass line-side and trunk-side facilities plus the features, functions, and capabilities of the switch. The line-side facilities include the connection between a loop termination at, for example, a main distribution frame (MDF), and a switch line card. Trunk-side facilities include the connection between, for example, trunk termination at a trunk-side cross connect panel and a trunk card. The "features, functions, and capabilities of the switch include the basic switching function of connecting lines to lines, lines to trunks, trunks to lines, trunks to trunks. ...
- 440. We require incumbent LECs to provide unbundled access to shared transmission facilities between end offices and the tandem switch. Further, incumbent LECs must provide unbundled access to dedicated transmission facilities between LEC central offices or between such offices and those of competing carriers. ...
- 441. The ability of new entrants to purchase the interoffice facilities we have identified will increase the speed with which competitors enter the market. By unbundling various dedicated and shared interoffice facilities, a new entrant can purchase all interoffice facilities on an unbundled basis as part of a competing local network, or it can combine its own interoffice facilities with those of the incumbent LEC. The opportunity to purchase unbundled interoffice transport will decrease the cost of entry compared to the much higher cost that would be incurred by an entrant that had to construct all of its own facilities. An efficient new entrant might not be able to compete if it were required to build interoffice facilities where it would be more efficient to use the incumbent LEC's facilities....
- 447. Section 251(d)(2)(B) requires the Commission to consider whether the failure to provide access to an unbundled element "would impair the ability of the telecommunications carrier seeking access to provide the services it seeks to offer." We have interpreted the term "impair" to mean either increased cost or decreased service quality that would result from using network elements other than the one sought. ...
- 450. ... We also decline at this time to address the unbundling of incumbents LECs "dark fiber." Parties that address the issue do not provide us with information on whether dark fiber qualifies as a network element under sections 251(c)(3) and 251(d)(2). Therefore, we lack a sufficient record on which to decide this issue. We will continue to review and revise our rules in this area as necessary.

# References for Unbundled Local Switching

#### Relevant Provisions of the Act

### § 271(c)(2)(B) COMPETITIVE CHECKLIST

- (vi) Local switching unbundled from transport, local loop transmission, or other services.
- § 251 (c)(3) Unbundled access. (See citation above.)
- § 251(c)(6) Collocation—The duty to provide, on rates, terms, and conditions, that are just and reasonable, and nondiscriminatory, for physical collocation of equipment necessary for interconnection or access to unbundled network elements at the premises of the local exchange carrier....

# Selected sections of FCC rules (not under stay)

- § 51.307 Duty to provide access on an unbundled basis to network elements. (See citation above.)
  - § 51.309 Use of unbundled network elements. (See citation above.)
  - § 51.319 Specific unbundling requirements.
    - (c) Switching Capability
      - (1) Local Switching Capability.
  - (i) The local switching capability network element is defined as:

    (A) line-side facilities, which include, but are not limited to, the connection between a loop termination at a main distribution frame and a switch line card;
  - (B) trunk-side facilities, which include, but are not limited to, the connection between trunk termination at a trunk-side cross-connect panel and a switch trunk card; and
  - (C) all features, functions, and capabilities of the switch, which include but are not limited to:
  - (1) the basic switching function of connecting lines to lines, lines to trunks, trunks to lines, and trunks to trunks, as well as the same basic capabilities made available to the incumbent LEC's customers, such as a telephone number, white page listing, and dial tone; and
  - (2) all other features that the switch is capable of providing, including but not limited to custom calling, custom local area signaling service

features, and CENTREX, as well as any technically feasible customized routing functions provided by the switch.

# Selected sections of FCC rules (stayed pricing rule)

### § 51.515 Application of access charges.

(a) Neither the interstate access charges described in part 69 nor comparable intrastate access charges shall be assessed by an incumbent LEC on purchasers of elements that offer telephone exchange or exchange access services.

Selected descriptions in the body of 96-325 FCC Interconnection Order in CC docket No. 96-98:

- 356. We confirm our tentative conclusion in the NPRM that section 251(c)(3) permits interexchange carriers and all other requesting carriers, to purchase unbundled elements for the purposes of offering exchange access services, or for the purpose of providing exchange access services to themselves in order to provide interexchange services to consumers. Although we conclude below that we have discretion under the 1934 Act, as amended by the 1996 Act, to adopt a limited, transitional plan to address public policy concerns raised by the bypass of access charges via unbundled elements, we believe that our interpretation of section 251(c)(3) in the NPRM, is compelled by the plain language of the 1996 Act. As we observed in the NPRM, Section 251(c)(3) provides that requesting telecommunications carriers may seek access to unbundled elements to provide a "telecommunications service" and exchange access and interexchange services are telecommunications services. Moreover, section 251(c)(3) does not impose restrictions on the ability of requesting carriers to "combine such elements in order to provide such telecommunication service(s)." Thus, we find that there is no statutory basis upon which we could reach a different conclusion for the long term.
- 412. We define the local switching element to encompass line-side and trunk-side facilities plus the features, functions, and capabilities of the switch. The line-side facilities include the connection between a loop termination at, for example, a main distribution frame (MDF), and a switch line card. Trunk-side facilities include the connection between, for example, trunk termination at a trunk-side cross connect panel and a trunk card. The "features, functions, and capabilities of the switch include the basic switching function of connecting lines to lines, lines to trunks, trunks to lines, trunks to trunks. It also includes the same basic capabilities that are available to the incumbent LEC's customers, such as telephone number, directory listing, dial tone, signaling, and access to 911, operator services, and directory assistance. In addition, the local switching

element includes all vertical features that the switch is capable of providing, including custom calling, CLASS features, and CENTREX, as well as any technically feasible customized routing functions. Thus, when a requesting carrier purchases the local switching element, it obtains all switching features in a single element on a per-line basis. A requesting carrier will deploy individual vertical features on its customers' lines by designating, via an electronic ordering interface, which features the incumbent LEC is to activate for particular customer lines.

579. We believe that section 251(c)(6) generally requires that incumbent LECs permit the collocation of equipment used for interconnection or access to unbundled network elements. Although the term "necessary," read most strictly, could be interpreted to mean "indispensable" we conclude that for purposes of section 251(c)(6) "necessary" does not mean "indispensable" but rather "used" or "useful." ... Even if the collocator could use other equipment to perform a similar function, the specified equipment may still be "necessary" for interconnection or access to unbundled network elements under section 251(c)(6). We can easily imagine circumstances, for instance, in which alternative equipment would perform the same function, but with less efficiency or at a greater cost. . . .

581. At this time, we do not impose a general requirement that switching equipment be collocated since it does not appear that it is used for the actual interconnection or access to unbundled network elements. We recognize, however, that modern technology has tended to blur the line between switching equipment and multiplexing equipment, which we permit to be collocated. We expect, in situations where the functionality of a piece of equipment is in dispute, that state commissions will determine whether the equipment at issue is actually used for interconnection or access to unbundled elements. We also reserve the right to reexamine this issue at a later date if it appears that such action would further achievement of the 1996 Act's procompetitive goals. . . .

# Notice of Proposed Rulemaking CC Docket No. 96-262, Access Charge Reform

170. Unbundled elements provide a ubiquitous substitute for access service. Where access charges exceed forward-looking economic cost (due to the structure or level of access being inefficient), IXCs have an artificial incentive to 'win' the customer and provide both local and toll service using unbundled elements. We expect that availability of unbundled elements at TELRIC prices as a substitute for access charges will ultimately require the LEC to set its charges in an economically efficient manner....

Selected sections of the FCC Order on Reconsideration, adopted September 27, 1997 (pricing rules are stayed but interconnection rules are not stayed)

- 1. ... Pursuant to section 1.08 of the Commission's rules, we here reconsider on our own motion two specific issues addressed in the First Report and Order. We expect that parties may raise other issues in petitions for reconsideration. First, we establish a flat-rated default proxy range for the non-traffic sensitive costs of basic residential and business line ports associated with the unbundled local switching element. ... Second, we clarify that because the First Report and Order concluded that the local switching element includes dedicated facilities, the requesting carrier is thereby effectively precluded from using unbundled switching to substitute for switched access services where the loop is used to provide both exchange access to the requesting carrier and local service by the incumbent LEC. ...
- 2. Background ... We concluded in the First Report and Order that "A combination of a flat-rated charge for line ports, which are dedicated to a single new entrant and either a flat-rated or per-minute charge for the switching matrix and for trunk ports which constitute shared facilities, best reflects the way costs for unbundled local switching are incurred and is therefore reasonable." We remain convinced that the pricing methodology and rate structures established in the First Report and Order are correct and should be implemented by state commissions in arbitration proceedings.
- 4. We now reconsider on our own motion a limited aspect of that decision and establish a default proxy range for basic residential and business line port costs of the local switching elements. We see no reason at this time to revise the default proxy range for unbundled local switching that will apply to the traffic-sensitive element, including the switching matrix, the functionalities used to provide vertical features and the trunk ports. Moreover, we find no basis at this time for modifying the default proxy range for the termination of calls.
- 6. The data support the default proxy we established for the termination portion of transport and termination ... because we found that the "additional cost" to the incumbent LEC of terminating a call that originates on another network includes only the usage sensitive costs, including the switching matrix and the trunk ports, but not the non-traffic-sensitive costs of local loops and line ports associated with the local loops. ...
- 11. In section V.I.2. of the First Report and Order, we stated that "when a requesting carrier purchases the unbundled local switching element, it obtains all switching features in a single element on a per-line basis." The unbundled switching element, as defined in the First Report and Order, includes the line card, which is often dedicated to a particular customer. Thus, a carrier that purchases the unbundled local switching element to serve an end user effectively obtains the exclusive right to provide all features, functions, and capabilities of the switch, including switching for exchange access and local exchange service for that end user. A practical consequence of this

determination is that the carrier that purchases the local switching element is likely to provide all available services requested by the customer served by that switching element, including switching for local exchange and exchange access. We further note that the pricing methodology set forth in the First Report and Order for the unbundled switching element, included cost of components (e.g., line ports) necessary to provide switching for both local exchange and exchange access services, and contemplated that the carrier purchasing the unbundled switch would provide switching for both local exchange and exchange access services. (references to ¶412, 414, 423 of First Report and Order)

13. We thus make clear that, as a practical matter, a carrier that purchases an unbundled switching element will not be able to provide solely interexchange service or solely access service to an interexchange carrier. A requesting carrier that purchases an unbundled local switching element for an end user may not use that switching element to provide interexchange service to end users for whom that requesting carrier does not also provide local exchange service. Using unbundled switching elements in such a manner would be inconsistent with our statement in the First Report and Order that "a competing provider orders the unbundled basic switching element for a particular customer line..." (references ¶414 of First Report and Order)

#### 1. Dark fiber

The FCC in its Interconnection Order declined to address the issue of dark fiber as it did not have sufficient information to determine whether dark fiber qualifies as a network element.

(¶450) In addition, the Act defines a network element to be a facility or equipment used in the provision of telephone exchange or exchange access. The Commission considered several factors in arriving at its decision to require dark fiber to be offered on an unbundled basis.

Ameritech asserts that the lack of electronics means that dark fiber is not used in providing telecommunications service. However, an analogy can be made to local loops which are in place but are not yet hooked up to serve a customer premises; these are considered to be available in providing telecommunications services. Dark fiber is capacity to accommodate expected growth in the same sense that extra loops are capacity to accommodate expected growth. Accordingly,

dark fiber is used in the provision of telecommunications service and therefore is a network element and should be unbundled and made available.

In its March 3, 1997, Statement, Ameritech did not offer dark fiber. Ameritech revised its filing on March 26, 1997, to offer dark fiber and provided a price list for such dark fiber. AT&T and MCI allege the offering is discriminatory and raise concerns regarding the limitations. Ameritech places on when it will offer dark fiber and whether or not it will continue to offer dark fiber. Further concerns were expressed by the parties regarding the definition of critical terms and the prices at which dark fiber is offered. These allegations and concerns taken together are convincing that Ameritech's offering of dark fiber is inadequate to qualify as the offering of an unbundled element. While the tariff will remain in place as an offering, a future filing of the Statement should bolster the dependability and predictability of the offering. Further, Ameritech's pricing of dark fiber has not been adequately reviewed thus far in this proceeding, so it will need to be addressed in a future filing.

# 2. Shared/common transport

This Commission is in the position of needing to determine if Ameritech's unbundled transport offering is in compliance with the Act and FCC rules while the FCC is in the process of reconsidering its rules in this area. Ameritech requested that this Commission approve its Statement, but also defer any determination on the shared interoffice transport issue until the FCC resolves this matter and simply require that Ameritech conform to the FCC's final resolution of this issue when issued. This is not a plausible alternative. This Commission must determine whether or not Ameritech's Statement is in compliance with §§ 251 and 252(d) of the

Act and FCC rules and the offering must be available <u>before</u> it can approve a Statement.

Therefore, this Commission cannot approve a Statement based on Ameritech's intent to comply with potential future FCC rules. If the Commission is to wait until the FCC reconsideration is complete for guidance regarding shared transport, then approval of the Statement must wait until that reconsideration is complete.

The Commission, however, provides Ameritech two alternatives to obtain approval of its Statement. Below are this Commission's findings that Ameritech's Statement as filed does not comply with the Act and the FCC rules as currently in effect. The first alternative we provide is that if Ameritech decides to file another Statement before the FCC completes its reconsideration, then the Statement must comply with the unbundled transport requirements given in this order. The second alternative is that Ameritech can wait and not file another Statement until after the FCC has completed its reconsideration. If the FCC alters its rules on unbundled transport, then Ameritech can obtain approval for this offering by complying with the FCC rules.

Commissioner Mettner dissented with regard to providing the second option.

This Commission determines that Ameritech's offering of unbundled transport does not provide all transport facilities on an unbundled basis. Only DS-1 facilities are offered on an unbundled basis. The requirement to offer unbundled network elements in § 251(c)(3) does not allow for the exclusion of any facilities. In addition, the Commission finds Ameritech's proposal only offers dedicated unbundled transport and does not offer shared unbundled transport as required by 47 CFR § 51.319(d). To correct these deficiencies Ameritech must offer all transport facilities on both a shared basis and a dedicated basis. Shared transport must use

Ameritech's routing tables and not require engineering or dedicated ports. Separate customized routing and engineering can only be required for dedicated or fractions of dedicated facilities.

Ameritech's March 3, 1997, Statement required that dedicated trunk ports sized by DS-1, DS-3, OC-3 to OC-48 be purchased and combined with dedicated transport sold in mileage increments of the same size denominations and tandem transport termination of the same size denominations to provide unbundled transport between Ameritech's central office switches and Ameritech's tandem switches (consisting of a path and terminations on each end; local office and tandem). Ameritech's March 3, 1997, filing also included a "shared company transport" in which the mileage rate elements could be purchased in denominations of 1/24 of a DS-1, but the termination facilities are offered only in the above stated full denominations or, when on a minute-of-use basis, based on Ameritech's existing access rates. Ameritech later revised the local office trunk ports and the tandem transport termination to be offered in 1/24 of a DS-1 size denomination as well. Only DS-1 facilities are offered on a fractional basis. In addition, customized routing must be purchased to route traffic over the fractional or full-sized facilities.

Ameritech offers only the least efficient facilities (DS-1) on a fractional or per-channel basis. More efficient facilities like DS-3 or OC-Xs are not sold on a fractional basis. For other than the DS-1 facilities, Ameritech only offers the same size denominations of transport that a competing provider would need to buy if it were seeking to compete using its own facilities instead of unbundled elements. (The terms DS-1, DS-3, and various OC-Xs refer to sizes of complete facilities.) In effect, competing carriers are expected to build their own networks; only their networks would be built from buying facilities-sized unbundled elements instead of just buying facilities. It is not reasonable to define unbundled transport in a manner that provides no

difference from purchasing facilities. Competing carriers should be able to specify any facility such as DS-3 or OC-X's service in fractions.

The Act clearly spells out three means of competition: (1) resale, (2) unbundled network elements and (3) facilities-based competition. The Act clearly provides two ways to use the incumbent's networks: (1) unbundled network elements based on cost and (2) resale based on a discount off of the retail price. Providing unbundled network elements in addition to resold whole services serves a number of important purposes. When providers just want to match Ameritech's offering, resale is available.

Unbundled network elements provide a competitive restraint on the incumbents' retail rates. With unbundled network elements priced based on cost, if Ameritech raises its retail rates excessively, competitors can chose to purchase unbundled elements and charge lower rates. In rural areas where facilities-based competition will likely be inefficient, the availability of unbundled network elements based upon cost may serve as an important restraint on retail rate increases.

Providers that do not have the volume of traffic to justify the purchase of their own facilities need Ameritech's unbundled network elements in order to compete. To avoid inefficient overbuilding of facilities, competitors need to be able to purchase unbundled network elements in quantities that will be reasonable given their volume of traffic.

In addition, unbundled network elements can also be used to provide multiple retail services in different proportions than Ameritech provides retail services. The availability of unbundled network elements encourages more efficient use of facilities or offering new services with existing facilities.

Accordingly, it is important that all three means of competition are available. It is unreasonable for Ameritech to define network elements in a way that provides only two means of competing with Ameritech, resale and facilities-based competition and to define unbundling in a way that provides no meaningful difference from facilities-based competition. The Commission finds that offering unbundled transport in the same sizes as full facilities does not met the requirement to provide unbundled transport. The Commission requires that all transport facilities, DS-1, DS-3 and various OC-Xs must be offered on both a shared and dedicated basis. A reasonable size dedicated offering would allow a logical progression to more concentrated facilities without overbuilding. For example DS-3 facilities should be sold in at least DS-1 size fractions.

Ameritech's minute-of-use offering does not provide unbundled transport either.

Ameritech's minute of use offering is an access retail service. The pricing of access does not comply with the pricing rules in § 252(d) of the Act and, therefore, cannot fulfill the requirement to provide unbundled transport.

Ameritech's offering of fractions of DS-1 does not provide shared or common transport. The FCC Interconnection Order (CC Docket No. 96-98) describes unbundled transport on a customer-line basis at ¶412, 414, and 423 and on a minute-of-use basis at ¶258 and 428. DS-1 transport consists of 24 channels. A single transport channel can serve many voice lines. This is because all voice lines are not in simultaneous use for a full hour during the system busy hour. Telecommunications systems are designed to have many voice lines served by a single transport channel based on expected calling patterns. If too many voice lines feed into a single transport channel, such that a busy hour call cannot be handled, the end user receives a fast busy signal for

such a blocked call. The determination of the number of voice lines that can be served by each channel is a product of the engineering of Ameritech's transport network. The FCC's percustomer-line and minute-of-use language reflects the intent to provide competitors the ability to share Ameritech's facilities as they have been designed and engineered.

This is further reflected in the FCC's use of the term functionality. The FCC identifies how it views the unbundling of the transport functionality in ¶258, which says, "Carriers seeking other elements, especially shared facilities such as common transport, are essentially purchasing access to a functionality of the incumbent's facilities on a minute-by-minute basis." Paragraph 444 states that the FCC does not require physical partitioning of a particular piece of transport equipment, but instead permits competitors to use the functionality in the same manner that incumbent LECs now permit IXCs to use such functionality, which is on a minute-of-use basis. The concept of functionality is codified in the following rule: "An incumbent LEC shall provide a requesting telecommunications carrier access to the facility or functionality of a requested network element separate from access to the facility or functionality of other network elements, for a separate charge." (47 CFR § 51.307(d)) In the context of the narrative of the Interconnection Order, it is reasonable to interpret this as meaning that access to facilities is provided where facilities are dedicated and access to functionalities is provided where facilities are shared among more than one end user.

Ameritech's current "Shared Company Transport" offering requires providers to couple the transport with dedicated ports on each end. Ameritech also requires that purchasers of "Shared Company Transport" to purchase customize routing to specify the route traffic will

follow. The use of dedicated ports customized routing makes this an offering of dedicated transport and not shared transport.

Common or shared transport does not have this type of routing restrictions. Similar to how access rates are structured, common transport can be used to transport calls at times when a provider's dedicated facilities are at capacity. In such cases, the calls carried over common access transport are routed according to Ameritech routing tables. The existence of dedicated ports and customized routing are the means by which transport is made dedicated. Shared or common transport flows through Ameritech ports and Ameritech's routing tables are used to direct the traffic. Shared or common transport should not be route specific.

The FCC rules require that both dedicated transport as well as shared transport (herein also called common transport) be offered per § 51.319(d)(1). Accordingly, the Commission finds that Ameritech's unbundled transport offering is deficient because it does not offer shared transport. Ameritech must offer shared transport with the meaning of shared transport being that it uses Ameritech's routing tables and it does not require separate engineering or dedicated ports.

Ameritech included a provision in its fractional transport option that competitors cannot have more than 23 channels worth of fractional transport over a particular route. Ameritech is imposing terms such that competitors could not rely solely on common or shared transport when the provider has enough traffic to justify dedicated transport. While this is a reasonable concern, Ameritech's proposed language would prevent a competitors' customers from completing calls when its network exceeds its normal capacity. This restriction prevents competitors from using common transport to handle true overflow situations. Such an outcome is not reasonable.

Instead, Ameritech should develop an additional charge which applies when the competitor

exceeds dedicated transport capacity, along the lines of the Feature Group D (FGD) blocking charge in the access tariff. Such a surcharge would provide a financial incentive for providers to avoid excessive peak capacity overflow onto unbundled common transport. If Ameritech wishes to impose such an overflow surcharge, it must file the tariff change along with cost support and justification. This tariff would be subject to Commission review in any refiling of the Statement.

In conclusion, Ameritech must offer all transport facilities on both a shared basis and a dedicated basis. Unbundled dedicated transport has dedicated ports, customized routing and is in sizes that allow a reasonable progression to more concentrated facilities without overbuilding. Shared or common transport uses Ameritech's routing tables and does not require engineering or customized routing. If Ameritech decides to file another Statement before the FCC completes its reconsideration, then the Statement must comply with the unbundled transport requirements given in this order. If Ameritech decides to wait and not file another Statement until after the FCC has completed its reconsideration, then Ameritech can obtain approval of its Statement by complying with the newly issued FCC rules.

# 3. Customized routing functions

When an Ameritech customer places a call, that call is routed according to Ameritech's routing table. Calls to customers served by the same switch are connected to the called party's port. Calls within the same calling area are routed to the appropriate interexchange trunk port, and then on to trunks leading to the correct switch. Calls covering longer distances are routed over trunks leading to the tandem switch, or to toll providers' points of presence. All of this is controlled by Ameritech's routing tables.

If competitors use their own transport networks, they will need routing tables to route calls onto those networks. Ameritech has referred to the creation of such routing tables as "customized routing." In its initial filing, Ameritech proposed making customized routing available only through a *bona fide* request (BFR) process.

In its first order, the Commission determined that customized routing was a standard part of unbundled service, and should therefore be available without a BFR process. In its March 3, 1997, filing, Ameritech has complied with this requirement.

No objection was raised regarding the pricing of customized routing service, so it is presumed reasonable at this time. Further review of the pricing and costing may be appropriate in a future filing of the Statement.

# 4. Vertical features

The FCC rules require an incumbent LEC to provide access to unbundled elements along with all of the unbundled network element's features functions and capabilities, in a manner that allows the requesting carrier to "provide any telecommunications service that can be offered by means of that network element." (47 CFR § 51.307(c)) Ameritech's original offerings provided only that it will make available those features Ameritech offers to its own customers.

Ameritech's offering makes other vertical features available, but only through the BFR process. In purchasing unbundled local switching, a competing carrier has already paid the cost of all vertical features the switch is capable of offering. The BFR process creates excessive delays in accessing those features—delays that would not be required in all situations. Therefore, in its February 20, 1997, oral decision the Commission concluded that vertical features, including

those not currently offered by Ameritech, must be made generally available without a BFR process.

In its March 3, 1997, Statement, Ameritech replaced the BFR process with a Switch Feature Request process which provides a response in no more than 60 days instead of the maximum 120 days under a BFR. In comments, Ameritech asserts that the process is necessary because network personnel need time to determine if the software is loaded on the switch. If the software is loaded it would still need to be tested to determine if it can function without affecting other existing switch features. Ameritech would also need to determine if right to use fees would be required by the switch vendor to activate the feature.

While AT&T alleges the process is still BFR under the tariff, the most recent filing simply imposes a maximum 60-day request period for implementation of a switch feature request. This revision makes the full features of the switch available to the CLECs in a nondiscriminatory manner relative to Ameritech's own internal processes for activation of switch features. What is missing from the offering is the provision of adequate information for a potential requester to do an independent prior evaluation of the cost and ease of addition of switch features. This tariff offering should clearly state that a customer of Ameritech's unbundled switching service shall be supplied with access to the list of features for each of its switches, the status of the feature, and adequate information on the applicable right to use fees.

No objection was raised regarding the pricing of filling switch feature request orders, so it is presumed reasonable at this time. Further review of the pricing and costing may be appropriate once the above switch feature information is made available for parties to do an independent analysis of the effect of the pricing.

# 5. Collocation of remote switching modules

## Relevant Provisions of the Act

- § 271(c)(2)(B) COMPETITIVE CHECKLIST.
  - (i) Interconnection in accordance with the requirements of §§ 251(c)(2) and 252(d)(1)
  - (x) Nondiscriminatory access to databases and associated signaling necessary for call routing.
- § 251(c)(2) INTERCONNECTION.—The duty to provide, for the facilities and equipment of any requesting telecommunications carrier, interconnection with the local exchange carrier's network—
  - (A) for the transmission and routing of telephone exchange service and exchange access;
    - (B) at any technically feasible point within the carrier's network;
  - (C) that is at least equal in quality to that provided by the local exchange carrier to itself or to any subsidiary, affiliate or any other party to which the carrier provides interconnection; and
  - (D) on rates, terms, and conditions that are just, reasonable and nondiscriminatory, in accordance with the terms and conditions of the agreement and the requirements of this section and section 252.
- § 251(c)(6) COLLOCATION.—The duty to provide, on rates, terms, and conditions that are just, reasonable and nondiscriminatory, for physical collocation of equipment necessary for interconnection or access to unbundled network elements at the premises of the local exchange carrier...
  - § 252(d) PRICING STANDARDS.
  - (1) INTERCONNECTION AND NETWORK ELEMENT CHARGES.—Determinations by a State commission of the just and reasonable rate for interconnection of facilities and equipment for purposes of subsection (c)(2) of section 251, and the just and reasonable rate for network elements for purposes of subsection (c)(3) of such section—
    - (A) shall be--
      - (i) based on the cost (determined without reference to a rate-ofreturn or other rate-based proceeding) of providing the interconnection or network element (whichever is applicable), and
        - (ii) nondiscriminatory, and
    - (B) may include a reasonable profit.